CLAIMS

1. A method of producing a water-based pigment dispersion for ink-jet ink, comprising:

a kneading process for kneading a mixture containing a styrene-based resin, a quinacridone-based pigment, a phthalimidomethylated quinacridone-based compound, an alkali metal hydroxide and a humectant to produce a solid and colored kneaded mixture; and

a dispersing process for dispersing the solid and colored kneaded mixture in an aqueous medium, wherein

the styrene-based resin has 60% by mass or more of a styrene-based monomer unit based on all monomer components, a monomer unit containing an unsaturated aliphatic carboxylic acid having a radical polymerizable double bond, an acid value of 50 to 300 and a weight-average molecular weight of 7500 to 40000.

2. The method of producing a water-based pigment dispersion for ink-jet ink according to claim 1, wherein a quinacridonesulfonic acid-based compound is added in the kneading or dispersing step.

3. The method of producing a water-based pigment dispersion for ink-jet ink according to claim 1, wherein the styrene-

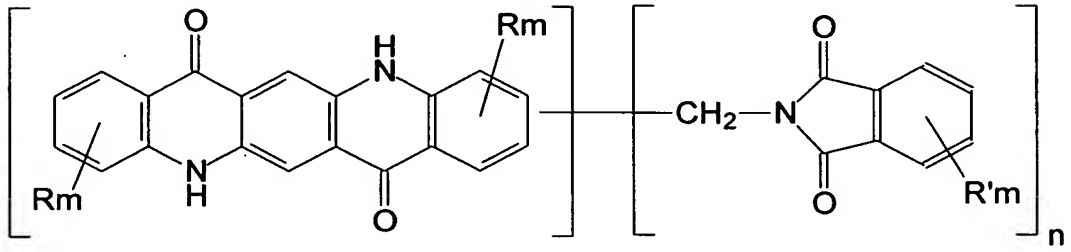
based resin has 60% by mass or more of a styrene-based monomer unit based on all monomer components, an acrylic acid monomer unit and a methacrylic acid monomer unit.

4. The method of producing a water-based pigment dispersion for ink-jet ink according to claim 1 or 2, wherein, in the kneading step, the content of the styrene-based resin is from 10 to 50% by mass based on 100 parts by mass of the total amount of the quinacridone-based pigment, the phthalimidomethylated quinacridone-based compound and the quinacridonesulfonic acid-based compound, the content of the humectant is from 40 to 80 parts by mass based on 100 parts by mass of the total amount, and the solid content of the kneaded mixture during kneading is from 50 to 80% by mass.

5. The method of producing a water-based pigment dispersion for ink-jet ink according to claim 1 or 2, wherein the styrene-based resin has a glass transition point of 90°C or higher.

6. The method of producing a water-based pigment dispersion for ink-jet ink according to claim 1 or 2, wherein the amount of the alkali metal hydroxide is 0.8 to 1.2 times the amount required to neutralize all carboxyl groups of the styrene-based resin.

7. The method of producing a water-based pigment dispersion for ink-jet ink according to claim 1, wherein the phthalimidomethylated quinacridone-based compo und is a compound represented by the formula (I):



...(I)

wherein R and R' each independently represents hydrogen, halogen, an alkyl group having 1 to 5 carbon atoms or an alkoxy group having 1 to 5 carbon atoms, m represents 0, 1 or 2, and n represents 1 to 4.

8. The method of producing a water-based pigment dispersion for ink-jet ink according to claim 1, wherein the quinacridone-based pigment is C.I. Pigment Red 122.

9. An ink composition for ink-jet recording comprising, as a main component, the water-based pigment dispersion for ink-jet ink produced by the method of any one of claims 1 to 3, 7 and 8.

10. The ink composition for ink-jet recording according to

claim 9, which is used for a thermal jet type printer.